PATENT Case No. 18972PIE

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE DECLARATION AND POWER OF ATTORNEY

Commissioner of Patents and Trademarks Washington, D.C. 20231

	As a below-name	d inventor, I hereby	declare that I belie	ve I am the:			
	original, first and sole inventor; or						
_				r Pathanata	ar ann an		
M	an original, first and j	oint inventor along v	vith the other inver	ntors listed below, of the subject	ot matter which is		
claim	ned and for which a par	tent is sought on the	invention entitled				
	NUCLEIC	C ACID PHARMA	CEUTICALS - II	NFLUENZA MATRIX			
the s	pecification of which	is attached he	ereto;				
		was filed on	June 5, 1995	as Application			
		Serial No.		and was amended	i		
Hard The		through		(if applicable).			
	I hereby state tha	t I have reviewed ar	nd understand the o	contents of the above-identified	d specification, including		
the c	elaims, as amended as	indicated above.					
and the second	I acknowledge the	e duty to disclose to	the Patent and Tra	ademark Office all information	known to me to be material		
1907	e patentability of this a	pplication in accorda	ance with Title 37,	Code of Federal Regulations,	§1.56.		
Account to the second s							
			Foreign Prio	prity			
	I hereby claim for	eign priority benefits	under Title 35, Ur	nited States Code, §119 of any	foreign application(s)		
for p	atent or inventor's cert	ificate listed below a	and have also ident	tified below any foreign applica	ation for patent or		
inve	ntor's certificate for the	same invention hav	ving a filing date be	fore that of the application on	which priority is claimed:		
			Prior Foreign Ap	plication(s)	Priority Claimed		
	<u> </u>						
Cour	ntry Nu	umber	Date Filed	Attorney Docket	Yes No		
Γ							
Cour	ntry Ni	umber	Date Filed	Attorney Docket	Yes No		

Prior United States Filing

I hereby claim the benefit under Title 35, United States Code, §120 of any United States application(s) listed below and, insofar as the subject matter of each of the claims of this application is not disclosed in the prior United States application(s) in the manner provided by the first paragraph of Title 35, United States Code, §112, I acknowledge the duty to disclose material information as defined in Title 37, Code of Federal Regulations, §1.56(a) which occurred between the filing date(s) of the prior application(s) and the national or PCT international filing date of this application:

08/032,383	May 18, 1993	ABANDONED	18972
Appin. Ser. No.	Filing Date	Status	Attorney Docket
			T
Appln. Ser. No.	Filing Date	Status	Attorney Docket
Appln. Ser. No.	Filing Date	Status	Attorney Docket
Appln. Ser. No.	Filing Date	Status	Attorney Docket
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Appln. Ser. No.	Filing Date	Status	Attorney Docket
Appln. Ser. No.	Filing Date	Status	Attorney Docket
Appln. Ser. No.	Filing Date	Status	Attorney Docket

A	nd I hereby appoint				
CHRISTIN	E E. CARTY	JACK L. T	RIBBLE	JOSEPH	F. DIPRIMA
Reg. No.	36,099	Reg. No.	32,633	Reg. No.	28,944

respectively and individually, as my attorneys or agents with full power of substitution and revocation, to prosecute this application and to transact all business in the Patent and Trademark Office connected therewith. Please address all communications to:

Christine E. Carty
Patent Department
Merck & Co., Inc.
P.O. Box 2000
Rahway, NJ 07065-0907

Telephone No. (908) 594- 6734

I hereby declare further that all statements made herein of my own knowledge are true and that all statements made on information and belief are believed to be true; and further that these statements were made with the knowledge that willful false statements and the like so made are punishable by fine or imprisonment, or both, under section 1001 of Title 18 of the United States Code and that such willful false statements may jeopardize the validity of the application or any patent issuing thereon.

Full name of sole or joint inventor	John J. Donnelly	Full name of joint inventor	Varavani J. Dwarki
Inventor's Signature		Inventor's Signature	
Date		Date	
Residence	Havertown, PA 19083	Residence	Alameda, CA 94501
Citizenship	US	Citizenship	IN
Post Office Address (if different from above)	Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907	Post Office Address (if different from above)	Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907
Full name of joint inventor	Margaret A. Liu	Full name of joint inventor	Donna L. Montgomery
Inventor's Signature		Inventor's Signature	
Date		Date	
Residence	Rosemont, PA 19190	Residence	Chalfont, PA 18914
Citizenship	US	Citizenship	US
Post Office Address (if different from above)	Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907	Post Office Address (if different from above)	Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907

Full name of joint inventor	Suezanne E. Parker	Full name of joint inventor	John W. Shiver
Inventor's Signature	Sw. 2 3 Pa	Inventor's Signature	
Date	8/7/95	Date	
Residence	San Diego, CA 92130	Residence	Doylestown, PA 18901
Citizenship	US	Citizenship	US
Post Office Address (if different from above)	Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907	Post Office Address (if different from above)	Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907
Full name of joint inventor	Jeffrey B. Ulmer	Full name of joint inventor	
Inventor's Signature		Inventor's Signature	
Date		Date	
Residence	Chalfont, PA 18914	Residence	
Citizenship	CA	Citizenship	
Post Office Address (if different from above)	Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907	Post Office Address (if different from above)	

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IN THE UNITED STATES PATENT AND TRADEMARK OFFICE DECLARATION AND POWER OF ATTORNEY

Commissioner of Patents and Trademarks Washington, D.C. 20231

As a below-nar	As a below-named inventor, I hereby declare that I believe I am the:						
original, first and s	sole inve	entor; or					
an original, first ar	nd joint i	nventor along v	vith the other inventors	listed below, of the subject	ct matter which is		
claimed and for which a	patent i	s sought on the	invention entitled				
NUCL	EIC AC	CID PHARMA	CEUTICALS - INFL	UENZA MATRIX			
the specification of whic	h 🔲	is attached he	ereto;				
	\boxtimes	was filed on	June 5, 1995	as Application			
J. States		Serial No.		and was amended			
		through		(if applicable).			
I hereby state	that I ha	ve reviewed an	d understand the conte	nts of the above-identified	d specification, including		
the claims, as amended	as indic	ated above.					
			the Patent and Tradem	ark Office all information	known to me to be material		
	s applic	ation in accorda	ance with Title 37, Code	of Federal Regulations,	§1.56.		
			Foreign Priority				
	foreign	priority benefits	under Title 35, United	States Code, §119 of any	foreign application(s)		
for patent or inventor's o	ertificat	e listed below a	and have also identified	below any foreign applica	ition for patent or		
inventor's certificate for	the sam	e invention hav	ring a filing date before	that of the application on	which priority is claimed:		
			Prior Foreign Applica	tion(s)	Priority Claimed		
Country	Numbe		Date Filed	Attorney Docket	Yes No		
	<u> </u>				І п п		
Country	Numbe	ſ	Date Filed	Attorney Docket	Yes No		

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Appln, Ser. No.	Filing Date	Status	Attorney Docket
Appln. Ser. No.	Filing Date	Status	Attorney Docket

	nd I hereby appoint E E. CARTY	JACK L. T	RIBRI F	JOSEPHI	F. DIPRIMA
CHRISTIN	E E. CANTI				
Reg. No.	36,099	Reg. No.	32,633	Reg. No.	28,944
respectively	y and individually, as m	y attorneys or ager	nts with full power of	substitution and revoc	ation, to prosecute this
application	and to transact all busi	ness in the Patent	and Trademark Offic	ce connected therewith	. Please address all

Christine E. Carty
Patent Department
Merck & Co., Inc.
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Rahway, NJ 07065-0907

Telephone No. (908) 594- 6734

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Full name of sole or joint inventor	John J. Donnelly	Full name of joint inventor	Varavani J. Dwarki
Inventor's Signature		Inventor's Signature	Varavani I Dwenne
Date		Date	8/4/1995
Residence	Havertown, PA 19083	Residence	Alameda, CA 94501
Citizenship	US	Citizenship	IN
Post Office Address (if different from above)	Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907	Post Office Address (if different from above)	Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907
Full name of joint inventor	Margaret A. Liu	Full name of joint inventor	Donna L. Montgomery
Inventor's Signature		Inventor's Signature	
Date		Date	
Residence	Rosemont, PA 19190	Residence	Chalfont, PA 18914
Citizenship	US	Citizenship	US
Post Office Address (if different from above)	Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907	Post Office Address (if different from above)	Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907

Full name of joint inventor	Suezanne E. Parker	Full name of joint john W. Shiver
Inventor's Signature		Inventor's Signature
Date		Date
Residence	San Diego, CA 92130	Doylestown, PA 18901 Residence
Citizenship	us	Citizenship US
Post Office Address (if different from above)	Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907	Post Office Address (if different from above) Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907
U N		
Full name of joint inventor	Jeffrey B. Ulmer	Full name of joint inventor
thventor's Signature		Inventor's Signature
Date		Date
Residence	Chalfont, PA 18914	Residence
Citizenship	CA	Citizenship
Post Office Address (if different from above)	Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907	Post Office Address (if different from above)

Page 4 of 4 REV.3/30/95

ATENT Case No. 18972PIE

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE DECLARATION AND POWER OF ATTORNEY

Commissioner of Patents and Trademarks Washington, D.C. 20231

	As a below-name	ed inv	entor, I hereby decla	re that I believ	e I am the:	
	original, first and sol	le inve	entor; or			
\boxtimes	an original, first and	joint i	nventor along with ti	ne other invent	ors listed below, of the su	ubject matter which is
	med and for which a pa	atent i	s sought on the inve	ntion entitled		
Oidii	ned und for which a pe		, sought on the			
	NUCLEI	C AC	ID PHARMACEU	TICALS - IN	IFLUENZA MATRIX	
the	specification of which	\boxtimes	is attached hereto;			
			was filed on		as Applicati	on
			Serial No.		and was ame	nded
			through		(if applicable).	
				-		
200	I hereby state th	at I ha	ve reviewed and un	derstand the c	ontents of the above-ider	ntified specification, including
the	claims, as amended a	s indi	cated above.			
	i acknowledge ti	ne dut	y to disclose to the F	Patent and Tra	demark Office all informa	tion known to me to be material
~	he patentability of this	applic	ation in accordance	with Title 37, 0	Code of Federal Regulation	ons, §1.56.
				Foreign Prio	rity	
	I hereby claim fo	oreign	priority benefits und	er Title 35, Un	ited States Code, §119 o	f any foreign application(s)
for	patent or inventor's ce	rtificat	e listed below and h	ave also ident	ified below any foreign ap	pplication for patent or
inv	entor's certificate for th	ne san	ne invention having a	a filing date be	fore that of the application	n on which priority is claimed:
			Pric	or Foreign Ap	plication(s)	Priority Claimed
Г						П п п
Co	untry !	Numbe	r Da	te Filed	Attorney Docket	Yes No
	untry	Vumbe	r Da	te Filed	Attorney Docket	Yes No

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Appln. Ser. No.	Filing Date	Status	Attorney Docket
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	Filip Data	Status	Attorney Docket
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Appln. Ser. No.	Filing Date	Status	Attorney Docket
Appln. Ser. No.	Filing Date	Status	Attorney Docket
Appln, Ser. No.	Filing Date	Status	Attorney Docket

And I hereby appoint CHRISTINE E. CARTY	JACK L. TRIBBLE	JOSEPH F. DIPRIMA					
Reg. No. 36,099	Reg. No. 32,633	Reg. No. 28,944					
respectively and individually, as my attorneys or agents with full power of substitution and revocation, to prosecute this							
application and to transact all business in the Patent and Trademark Office connected therewith. Please address all							
communications to:							

Christine E. Carty
Patent Department
Merck & Co., Inc.
P.O. Box 2000
Rahway, NJ 07065-0907

Telephone No. (908) 594- 6734

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Full name of sole or joint inventor	John J. Donnelly	Full name of joint inventor	Varavani J. Dwarki
Inventor's Signature	Jory Pomely	Inventor's Signature	
Date	26 TU 95	Date	
_Residence	Havertown, PA 19083	Residence	Alameda, CA 94501
Citizenship	US	Citizenship	IN
Post Office Address (if different from above)	Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907	Post Office Address (if different from above)	Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907
Full name of joint inventor	Margaret A. Liu	Full name of joint inventor	Donna L. Montgomery
Inventor's Signature	Margaret a. Kin July 26, 1995	Inventor's Signature	Dona L. Mentgomey
Date	July 26, 1995	Date	July 24, 1995
Residence	Rosemont, PA 19190	Residence	Chalfont, PA 18914
Citizenship	US	Citizenship	us
Post Office Address (if different from above)	Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907	Post Office Address (if different from above)	Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907

Full name of joint inventor	Suezanne E. Parker	Full name of joint inventor	John W. Shiver
Inventor's Signature		Inventor's Signature	JW Show
Date		Date	7 25 95
Residence	San Diego, CA 92130	Residence	Doylestown, PA 18901
Citizenship	US	Citizenship	US
Post Office Address (if different from above)	Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907	Post Office Address (if different from above)	Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907
T T			
Full name of joint inventor	Jeffrey B. Ulmer	Full name of joint inventor	
Inventor's Signature	12/16	Inventor's Signature	
Date	7/26/95	Date	
Residence	Chalfont, PA 18914	Residence	
Citizenship	CA	Citizenship	
Post Office Address (if different from above)	Merck & Co., Inc. P.O. Box 2000 Rahway, NJ 07065-0907	Post Office Address (if different from above)	·

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Applicant(s): DONNELLY ET AL. Group Art Unit: 1819 Serial No.: 08/461,268 Examiner: K. HAUDA Filed: June 5, 1995 For: NUCLEIC ACID PHARMACEUTICALS INFLUENZA MATRIX 20231, on the ASSOCIATE POWER OF ATTORNEY Assistant Commissioner for Patents Washington, D.C. 20231 Sir: In connection with the above-identified application the undersigned attorney and/or agent of record, hereby appoints J. MARK HAND Registration No. 36,545 c/o Patent Dept., MERCK & CO., INC., P.O. Box 2000, Rahway, New Jersey 07065-0907, an associate attorney and/or agent, to prosecute this application, to make alterations and amendments therein, to receive the patent and to transact all business in the Patent and Trademark Office connected therewith. All communications in connection with the prosecution of the above-identified application should be sent to J. MARK HAND c/o Patent Dept., MERCK & CO., INC., P.O. Box 2000, Rahway, New Jersey 07065-0907. Respectfully submitted, Signed at Rahway, New Jersey Jack L. Tribble By: this 14T day Attorney for Applicant(s)

Reg. No. 32,633

DATE: October 14, 1997

(732)594- 5321

REV.7/1/97

of OCTOBER 1997

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